Before the Federal Communications Commission Washington, DC 20554

In the matter of)	
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Structure and Practices of the Video)	CG Docket No. 03-123
Relay Service (VRS) Program and on)	
Proposed VRS Compensation Rates)	CG Docket No. 10-51
)	

COMMENTS OF PUBLIC KNOWLEDGE

Public Knowledge writes to express its concerns with the proposal by CSDVRS to "facilitate migration of all VRS access technologies to a standard, software based VRS access technology ("application") that could be used on commonly available off-the-shelf hardware as a means of furthering the Commission's interoperability and portability goals." While the goal of interoperability is an important one, mandating the use of a single client application is the wrong way to achieve it.

Different VRS providers compete with each other to win customers by providing both the best service and differentiated ways of accessing those services. For example, a VRS provider might differentiate itself by providing the most polished user experience, a set of features only appealing to certain users, or by targeting a less-common hardware platform. The proposal in question would put a stop to that and could freeze in place today's technology, or some subset of it, depriving deaf and hard-of-hearing users of the benefit of new technologies, forcing them into lowest-common-denominator feature sets, and limiting them to the most (currently)

¹ Additional Comment Sought on Structure And Practices of the Video Relay Service (VRS) Program and on Proposed VRS Compensation Rates, CG Docket No. 03-123, CG Docket No. 10-51, DA 12-1644, (rel. Oct. 15, 2012), at ¶¶ 3-4, available at http://transition.fcc.gov/Daily_Releases/Daily_Business/2012/db1016/DA-12-1644A1.pdf.

popular hardware platforms. Even if there were any interoperability benefits to the CSDVRS proposal, which is doubtful, they would be more than outweighed by these negative consequences.

Furthermore, the Commission should be aware that if it mandates the use of a single application for VRS access, it could very likely unintentionally mandate the use of single hardware or operating system platforms. Generally an "application" can only run on particular platforms. A Windows program cannot run in OS X or Linux, and an iOS application cannot run on Android.² Mandating the use of a particular application, therefore, could end up mandating the use of particular hardware or devices—which may be expensive, or technologically inferior, or in any event difficult for users to obtain.

Even if the Commission attempts to require some kind of cross-platform solution, it could quickly find itself grappling with software development issues better left to the rapidly-changing marketplace. There is no single solution the Commission or a Commission-selected contractor could pick that would not carry a particular set of tradeoffs that would be sure to annoy some set of VRS users, if not cut them off from the service completely. For example, while Java has long promised true interplatform compatibility it is widely considered to have failed at that goal. Browser-

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² Technical workarounds such as virtual machines or WINE- or style API reimplementations are obviously not suitable for ordinary users. And even crossplatform software tools such as Unity or Adobe Flex that make it easier for developers to target multiple platforms still produce different native applications for each platform--for example, even an iOS application that is little more than a WebView (a "wrapper" for web-based content) is still purely an iOS application. In any event applications produced in this way often do not use native platform user interface behaviors and controls and perform worse than their purely-native counterparts.

based apps come closest to achieving true platform agnosticism they have their own

set of performance, functionality, security, and reliability concerns. The best way for

the Commission to deal with these software development issues is the way it does

now: permit different VRS providers to create their own software, perhaps making

different technical tradeoffs, and let the market decide between them.

Interoperability has been achieved in many other areas with requiring the use of

standardized client hardware or software. Different email systems, IM clients, and

telephone handsets can all interoperate. CSDVRS's proposal is in direct opposition

to the *Carterfone* principle and is akin to requiring all telephone users to use the

AT&T Princess Phone or all email users to use Lotus Notes. Deaf and hard-of-

hearing users deserve better than that and the Commission should not force them

into a technological backwater by adopting CSDVRS's proposal.

Respectfully submitted,

/s John Bergmayer Senior Staff Attorney

PUBLIC KNOWLEDGE

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